

IN THE CLAIMS

The current status of the claims is reflected in the below listing of claims.

1. - 2. (Canceled)

3. (Currently Amended) A catalyst for use in oxidation or reduction reactions comprising platinum, chromium, copper and nickel, wherein the concentration of platinum is at least about 1 atomic percent and less than 40 atomic percent.

4. - 8. (Canceled)

9. (Previously Presented) A catalyst for use in oxidation or reduction reactions, the catalyst comprising platinum, chromium, and nickel, wherein the platinum concentration is between about 15 atomic percent and about 40 atomic percent, the chromium concentration is between about 5 and about 25 atomic percent, and the concentration of nickel is between about 45 and about 70 atomic percent.

10. (Previously Presented) A catalyst for use in oxidation or reduction reactions, the catalyst comprising platinum, chromium, and copper, nickel, or a combination thereof, wherein the platinum concentration is between about 20 and about 35 atomic percent, the chromium concentration is between about 5 and about 25 atomic percent, and the concentration of copper, nickel or a combination thereof is between about 50 and about 65 atomic percent.

11. (Previously Presented) A catalyst for use in oxidation or reduction reactions, the catalyst comprising platinum,

chromium, and copper, nickel, or a combination thereof, wherein the platinum concentration is between about 20 and about 30 atomic percent, the chromium concentration that is between about 5 and about 25 atomic percent, and the concentration of copper, nickel or a combination thereof is between about 50 and about 65 atomic percent.

12. (Currently Amended) ~~The catalyst of claim 6~~ A catalyst for use in oxidation or reduction reactions, the catalyst comprising platinum, chromium, and nickel, wherein the concentration of platinum is less than 40 atomic percent, the ~~at a~~ concentration of chromium ~~that~~ is between about 5 and about 45 atomic percent, and the concentration of nickel ~~at a concentration that~~ is between about 15 and about 50 atomic percent.

13. (Previously Presented) The catalyst of claim 12 wherein the platinum concentration is no greater than about 35 atomic %.

14. (Previously Presented) The catalyst of claim 12 wherein the chromium concentration is between about 5 and about 35 atomic percent.

15. - 18. (Canceled)

19. (Currently Amended) A supported electrocatalyst powder for use in electrochemical reactor devices, the supported electrocatalyst powder comprising a catalyst comprising platinum at a concentration of at least about 1 atomic percent and less than 40 atomic percent, chromium at a concentration of no greater than 30 atomic percent, and nickel at a concentration of

at least 35 atomic %, and electrically conductive support particles upon which the catalyst is dispersed.

20. - 42. (Canceled)

43. (Currently Amended) A supported electrocatalyst powder for use in electrochemical reactor devices, the supported electrocatalyst powder comprising a catalyst comprising platinum at a concentration of at least about 1 atomic percent and less than 40 atomic percent, chromium at a concentration of no greater than 30 atomic percent, and nickel at a concentration of at least 45 atomic %, and electrically conductive support particles upon which the catalyst is dispersed.

44. (Previously Presented) The catalyst of claim 3 wherein the platinum concentration is no greater than about 35 atomic percent.

45. (Previously Presented) The catalyst of claim 3 wherein the chromium concentration is no greater than about 55 atomic percent.

46. (Previously Presented) The catalyst of claim 3 wherein the catalyst consists essentially of platinum, chromium, copper and nickel.

47. (Previously Presented) The catalyst of claim 3 wherein the catalyst comprises an alloy of platinum, chromium, copper and nickel.

48. (Previously Presented) The catalyst of claim 3 wherein the catalyst consists essentially of an alloy of platinum, chromium, copper and nickel.

49. (Currently Amended) A supported electrocatalyst powder for use in electrochemical reactor devices, the supported electrocatalyst powder comprising a catalyst comprising platinum at a concentration of at least about 1 atomic percent and less than 40 atomic percent, chromium, copper, and nickel, and electrically conductive support particles upon which the catalyst is dispersed.

50. - 53. (Canceled)

54. (Currently Amended) A supported electrocatalyst powder for use in electrochemical reactor devices, the supported electrocatalyst powder comprising a catalyst comprising platinum at a concentration of at least about 1 atomic percent and less than 40 atomic percent, chromium at a concentration of no greater than 30 atomic percent, and nickel, and electrically conductive support particles upon which the catalyst is dispersed.

55. - 58. (Canceled)

59. (Currently Amended) A supported electrocatalyst powder for use in electrochemical reactor devices, the supported electrocatalyst powder comprising a catalyst comprising platinum at a concentration of at least about 1 atomic percent and less than 40 atomic percent, chromium, and nickel at a concentration of at least 35 atomic percent, and electrically conductive support particles upon which the catalyst is dispersed.

60. - 63. (Canceled)

64. (Currently Amended) A supported electrocatalyst powder for use in electrochemical reactor devices, the supported electrocatalyst powder comprising a catalyst comprising platinum, chromium, and nickel, wherein the platinum has a concentration of at least about 1 atomic percent and less than 40 atomic percent, and electrically conductive support particles upon which the catalyst is dispersed.

65. (New) The catalyst of claim 3 wherein the platinum concentration is at least about 2 atomic percent.

66. (New) The catalyst of claim 3 wherein the platinum concentration is at least about 5 atomic percent.

67. (New) The catalyst of claim 12 wherein the platinum concentration is at least about 2 atomic percent.

68. (New) The catalyst of claim 12 wherein the platinum concentration is at least about 5 atomic percent.

69. (New) The supported electrocatalyst powder of claim 19 wherein the platinum concentration is at least about 2 atomic percent.

70. (New) The supported electrocatalyst powder of claim 19 wherein the platinum concentration is at least about 5 atomic percent.

71. (New) The supported electrocatalyst powder of claim 43 wherein the platinum concentration is at least about 2 atomic percent.

72. (New) The supported electrocatalyst powder of claim 43 wherein the platinum concentration is at least about 5 atomic percent.

73. (New) The supported electrocatalyst powder of claim 49 wherein the platinum concentration is at least about 2 atomic percent.

74. (New) The supported electrocatalyst powder of claim 49 wherein the platinum concentration is at least about 5 atomic percent.

75. (New) The supported electrocatalyst powder of claim 54 wherein the platinum concentration is at least about 2 atomic percent.

76. (New) The supported electrocatalyst powder of claim 54 wherein the platinum concentration is at least about 5 atomic percent.

77. (New) The supported electrocatalyst powder of claim 59 wherein the platinum concentration is at least about 2 atomic percent.

78. (New) The supported electrocatalyst powder of claim 59 wherein the platinum concentration is at least about 5 atomic percent.

79. (New) The supported electrocatalyst powder of claim 64 wherein the platinum concentration is at least about 2 atomic percent.

80. (New) The supported electrocatalyst powder of claim 64 wherein the platinum concentration is at least about 5 atomic percent.